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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
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| 09/590,859 | 06/08/2000 | Steven Casagrande | 159008-0003 | 9867 |

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| EXAMINER |
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KIM, JUNG W

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| ART UNIT | PAPER NUMBER |
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2132

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DATE MAILED: 02/02/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/590,859

Applicant(s)

CASAGRANDE, STEVEN

Examiner

Jung W Kim

Art Unit

2132

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 08 June 2000 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2,3,5.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Drawings

1. New corrected drawings are required in this application because the drawings are informal. Applicant is advised to employ the services of a competent patent draftsman outside the Office, as the U.S. Patent and Trademark Office no longer prepares new drawings. The corrected drawings are required in reply to the Office action to avoid abandonment of the application. The requirement for corrected drawings will not be held in abeyance.

Specification

2. The disclosure is objected to because of the following informalities: on page 3, line 13, the word anti-pirate is not spelled correctly; on page 4, line 6, the sentence is not grammatical; on page 7, line 22, the phrase 'monitory transaction' should read 'monetary transaction'. Appropriate correction is required.

3. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed. The following title is suggested: 'Method and apparatus to authenticate a user's system to prevent unauthorized usage of distributed software products'.

Claim Rejections - 35 USC § 112

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
5. Claims 1, 3, 5, 11 and 13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
6. Claims 1, 3, and 13 recite the limitation "the user's system". There is insufficient antecedent basis for this limitation in the claims.
7. Claims 1, 3, and 13 recite the limitation "the software product". There is insufficient antecedent basis for this limitation in the claims.
8. Claim 5 recites the limitation "the value". The limitation does not specify which of the two values specified in the claim the limitation is referring.
9. Claim 11 recites the limitation "the set of the second version of the first value". There is insufficient antecedent basis for this limitation in the claim. For the purpose of this examination, claim 10 will be identified as the base claim for claim 11.

Claim Rejections - 35 USC § 102

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States

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only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

11. Claims 1, 3, and 13 are rejected under 35 U.S.C. 102(e) as being anticipated by Larose et al. U.S. Patent No. 6,108,420 (hereinafter Larose). As per claims 1, 3, and 13, Larose discloses a process for protecting software products from unauthorized usage, comprising:

- a. determining a set of parameters associated with the user's system (see Larose, col. 5, lines 21-35);
- b. sending the parameters to a server (see Larose, col. 5, lines 35-36);
- c. forming a first value derived from the parameters (see Larose, col. 5, lines 43-46);
- d. sending the first value to the user's system (see Larose, col. 5, lines 468);
- e. determining a second set of the same parameters associated with the user's system and use the second set of parameters to form a second version of the first value (see Larose, col. 13, lines 16-19, lines 23-26);
- f. comparing the first and the second values, and if identical, sending the software product to the user's system and allowing the software product to be executed in the user's system (see Larose, col. 13, lines 27-30; col. 14, lines 25-37; col. 11, lines 41-46; Abstract).

The aforementioned cover claims 1, 3, and 13.

Claim Rejections - 35 USC § 103

12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

13. Claims 2, 4-7, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Larose in view of Friedman et al. U.S. Patent No. 6,240,513 (hereinafter Friedman). As per claims 2, 4-7, and 14, Larose discloses a process as outlined above in the claim 1, 3, and 13 rejections under 35 U.S.C. 102(e). Larose is silent on the matter of encrypting the software product using the first value and decrypting the software product using the second value. However, message encryption using keys that are derived from device/system parameters are commonly implemented in the art. Encryption/decryption keys derived from user's system parameters generate deterministic keys that uniquely correlate with a user's system. As an example, Friedman discloses static encryption/decryption keys that are generated using identification values particular to a user's system as seed values for a key generating algorithm. This feature also enables the invention to eschew secure storage of software encryption keys. It would be obvious to one of ordinary skill in the art at the time the invention was made to use keys based on the user's system parameters to encrypt/decrypt the software product. Motivation for such an implementation enables the generation of a deterministic cryptographically secure key unique to the user's

system to securely transmit software. The aforementioned covers claims 2, 4-7, and 14.

14. Claims 8-12 and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Larose in view of Friedman, and further in view of LeBourgeois U.S. Patent No. 6,026,166 (hereinafter LeBourgeois). As per claims 10-12, Larose covers a process as outlined above in the claim 1 and 3 rejections under 35 U.S.C. 102(e). Larose is silent on the matter of encrypting the first value with each member of the set of parameters to form a first encrypted set and later decrypting the first encrypted set by using each member of a new set of parameters to form a set of second versions of the first values, wherein a user's system is verified if a quorum of identical members of the set of the second versions of the first value exists. LeBourgeois discloses digitally certifying a user's computer system by signing each member of a set of parameters based on the user's computer system and verifying the system by first recreating a "real-time" signature on the same members, then determining if a quorum of identical signatures of the first set exists for the second set (see LeBourgeois, col. 8, line 20-col. 9, line 27; col. 10, lines 19-39; col. 11, line 56-col. 12, line 26). This verification means taught by LeBourgeois is a variant of the applicant's verification scheme. In both variations, a user's system is authenticated only if a subset of the current identifiers of the user's system matches a subset of the original identifiers of the user's system. Furthermore, as mentioned above, using the first value as an encrypting key for each member of the set of parameters is an obvious choice since it can be established as a non-predictable

but deterministic key. It would be obvious to one of ordinary skill in the art at the time the invention was made to authenticate the user's system by means of processing the members of a set of user's system parameters, comparing previously generated values with currently generated values wherein a verification of a user's system is made when the number of identical values satisfy a quorum condition. Motivation for such a combination would allow the user's system to be updated without being rendered by the distributor as a distinct system from the original user's system that initially registered the software.

15. As per claims 8-9, they are method claims corresponding to claim 10 and they do not teach or define above the information claimed in claim 10. Therefore, claims 8-9 are rejected under Larose in view of Friedman and LeBourgeois for the same reasons set forth in the rejection of claim 10.

16. As per claim 15, it is a system claim corresponding to claims 3-5, 7, 10-12 and it does not teach or define above the information claimed in claims 3-5, 7, 10-12. Therefore, claim 15 is rejected under Larose in view of Friedman and LeBourgeois for the same reasons set forth in the rejections of claims 3-5, 7, 10-12.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jung W Kim whose telephone number is (703) 305-8289. The examiner can normally be reached on M-F 9:00 A.M. to 5:00 P.M..

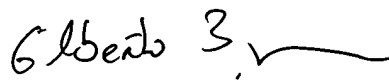
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gilberto Barron can be reached on (703) 305-1830. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-3900.



Jung W Kim
Examiner
Art Unit 2132

Jk
January 16, 2004



GILBERTO BARRON
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100